









FIG. 4

alcohol	experiment al pl ₅₀	run# (bubbler#)	sensor # polymer name: 	5 poly(vinyl chloride)	ക poly(ethylene oxide)
1-butanol	-0.05	1 (8)	0.23 (0.08)	0.01 (0.15)	1.83 (0.22)
1-heptanol	0.68	2 (6)	0.05 (0.10)	0.04 (0.16)	1.90 (0.10)
1-hexanol	0.54	3 (6)	0.09 (0.08)	0.03 (0.16)	1.76 (0.04)
1-pentanol	0.27	3 (7)	0.17 (0.10)	-0.03 (0.13)	1.63 (0.02)
1-propanol	-0.48	3 (3)	0.55 (0.14)	-0.03 (0.19)	1.18 (0.01)
2,4-dimethyl-3-pentanol	-1.38	2 (1)	0.05 (0.14)	-0.02 (0.13)	2.00 (0.06)
2-butanol	-0.35	2 (8)	0.20 (0.13)	-0.06 (0.12)	1.35 (0.04)
2-heptanol	0.25	1 (2)	0.13 (0.08)	-0.04 (0.09)	2.89 (0.54)
2-hexanol	0.15	2 (2)	0.16 (0.15)	0.01 (0.15)	1.69 (0.09)
2-methyl-1-butanol	-0.15	2 (7)	0.04 (0.11)	0.02 (0.12)	1.74 (0.05)
2-methyl-1-propanol	-0.39	1 (6)	0.12 (0.07)	0.01 (0.12)	1.84 (0.15)
2-methyl-3-pentanol	-0.89	1 (1)	0.13 (0.09)	0.06 (0.11)	2.34 (0.33)
2-pentanol	-0.07	3 (8)	0.06 (0.06)	-0.03 (0.13)	1.41 (0.02)
2-propanol	-0.47	1 (7)	0.24 (0.08)	0.13 (0.14)	1.58 (0.23)
3-hexanol	-0.47	3 (1)	0.07 (0.08)	0.01 (0.13)	1.57 (0.03)
3-methyl-1-butanol	-0.19	3 (5)	0.08 (0.08)	0.03 (0.08)	1.49 (0.02)
3-pentanol	-0.37	2 (4)	0.11 (0.09)	0.08 (0.15)	1.52 (0.04)
ethanol	-1.10	2 (3)	1.52 (0.15)	0.19 (0.14)	1.08 (0.02)
methanol	-3.09	1 (3)	3.71 (0.23)	0.57 (0.12)	1.33 (0.10)
neopentanol (solid)	-0.67	3 (2)	0.03 (0.10)	0.00 (0.18)	1.37 (0.04)
			, ,	, ,	,
benzyl alcohol	0.32	1 (4)	0.06 (0.07)	0.04 (0.13)	3.05 (0.91)
tert-amyl alcohol	-2.56		0.10 (0.10)	•	, ,
1,3-propanediol	-1.87	3 (4)	-0.02 (0.10)	0.04 (0.12)	• •
1,4-butanediol	-1.41	2 (5)	-0.01 (0.09)	-0.01 (0.15)	, ,
FIG. 5A					

poly(styrene/allyl alcohol)	poly(4-vinylphenol)	poly(vinyl acetate)	etethyl cellulose	poly(N-vinylpyrrolidone)
4	5	6	7	8
0.56 (0.08)	0.41 (0.17)	0.11 (0.08)	4.04 (0.20)	0.31 (0.70)
0.23 (0.02)	0.08 (0.11)	-0.07 (0.05)	4.28 (0.21)	0.52 (0.84)
0.45 (0.05)	0.11 (0.09)	-0.08 (0.05)	5.32 (0.18)	-0.07 (0.60)
0.58 (0.05)	0.16 (0.10)	0.02 (0.04)	4.97 (0.14)	0.67 (0.58)
0.57 (0.04)	0.70 (0.09)	0.20 (0.03)	3.17 (0.14)	1.08 (0.82)
0.17 (0.02)	0.10 (0.11)	0.00 (0.03)	4.94 (0.25)	0.11 (0.61)
0.65 (0.10)	0.29 (0.23)	0.14 (0.05)	3.89 (0.29)	0.23 (0.68)
0.28 (0.04)	0.11 (0.13)	-0.09 (0.05)	4.76 (0.18)	0.23 (0.99)
0.37 (0.03)	0.17 (0.11)	-0.05 (0.03)	5.10 (0.31)	0.77 (0.42)
0.34 (0.04)	0.16 (0.14)	-0.01 (0.04)	4.76 (0.27)	0.09 (0.73)
0.48 (0.08)	0.28 (0.14)	0.10 (0.03)	3.98 (0.20)	0.47 (0.59)
0.29 (0.05)	0.19 (0.11)	-0.03 (0.04)	5.24 (0.26)	0.76 (0.61)
0.57 (0.07)	0.14 (0.09)	0.00 (0.07)	4.90 (0.19)	0.68 (0.55)
0.57 (0.06)	0.62 (0.17)	0.14 (0.06)	3.31 (0.31)	0.40 (0.88)
0.40 (0.04)	0.07 (0.08)	-0.06 (0.05)	5.56 (0.23)	0.02 (1.03)
0.39 (0.03)	0.07 (0.07)	0.01 (0.04)	4.82 (0.13)	0.08 (0.83)
0.55 (0.06)	0.16 (0.13)	-0.01 (0.05)	4.83 (0.41)	-0.13 (0.81)
0.59 (0.05)	2.19 (0.17)	0.31 (0.03)	2.19 (0.14)	4.03 (0.74)
0.55 (0.03)	2.51 (0.21)	0.40 (0.07)	1.82 (0.22)	7.76 (0.78)
0.14 (0.03)	-0.01 (0.05)	0.02 (0.03)	3.28 (0.20)	-0.13 (0.79)
0.22 (0.03)	0.10 (0.07)	-0.03 (0.05)	2.07 (1.01)	-0.10 (0.59)
0.39 (0.07)	0.26 (0.14)	0.06 (0.05)	3.91 (0.29)	0.35 (0.62)
0.06 (0.02)	-0.01 (0.05)	0.01 (0.03)	0.40 (0.19)	-0.39 (0.80)
0.06 (0.06)	0.04 (0.06)	-0.02 (0.04)	0.81 (0.68)	-0.09 (0.79)
	, ,	FIG. 5B	(()

		7/10	(ap)	
poly(ethylene/acrylic acid)	poly(ethylene/vinyl acetate)	poly(methyl methacrylate)	poly(methylvinylether/maleic anhydride)	1,2-polybutadiene
9	10	11	12	13
1.65 (0.14)	0.74 (0.10)	0.00 (0.02)	-0.01 (0.01)	0.23 (0.10)
1.66 (0.09)	0.69 (0.04)	0.01 (0.03)	0.00 (0.01)	0.30 (0.02)
1.84 (0.05)	0.73 (0.02)	0.01 (0.03)	-0.01 (0.02)	0.28 (0.01)
1.70 (0.03)	0.67 (0.01)	0.01 (0.02)	0.00 (0.02)	0.21 (0.01)
1.07 (0.02)	0.40 (0.02)	0.01 (0.03)	-0.02 (0.02)	-0.03 (0.01)
2.49 (0.05)	2.42 (0.09)	0.02 (0.02)	0.03 (0.02)	1.19 (0.04)
1.62 (0.03)	0.76 (0.04)	0.00 (0.03)	-0.02 (0.01)	0.26 (0.01)
1.91 (0.06)	0.99 (0.04)	0.00 (0.03)	0.01 (0.03)	0.45 (0.02)
1.97 (0.05)	0.92 (0.03)	-0.01 (0.02)	0.10 (0.02)	0.45 (0.01)
1.82 (0.04)	0.91 (0.03)	-0.01 (0.02)	-0.01 (0.01)	0.41 (0.01)
1.65 (0.10)	0.78 (0.08)	0.00 (0.02)	-0.04 (0.02)	0.28 (0.07)
2.17 (0.02)	1.59 (0.04)	0.00 (0.03)	0.08 (0.02)	0.75 (0.02)
1.77 (0.02)	0.82 (0.02)	-0.01 (0.02)	0.00 (0.01)	0.34 (0.01)
1.45 (0.07)	0.63 (0.04)	0.00 (0.02)	-0.04 (0.03)	0.16 (0.05)
1.81 (0.04)	1.07 (0.01)	0.01 (0.02)	0.01 (0.02)	0.51 (0.01)
1.77 (0.02)	0.75 (0.02)	-0.01 (0.04)	-0.04 (0.02)	0.36 (0.01)
1.79 (0.03)	1.03 (0.04)	-0.01 (0.01)	-0.01 (0.02)	0.43 (0.01)
0.78 (0.03)	0.20 (0.04)	0.14 (0.03)	-0.03 (0.02)	-0.13 (0.03)
0.69 (0.03)	0.15 (0.04)	0.57 (0.03)	0.52 (0.05)	-0.01 (0.01)
1.54 (0.05)	0.94 (0.03)	0.00 (0.03)	0.00 (0.02)	0.42 (0.01)
0.58 (0.34)	0.33 (0.17)	-0.01 (0.02)	-0.04 (0.02)	0.11 (0.08)
2.05 (0.12)	1.04 (0.08)	0.00 (0.02)	-0.03 (0.02)	0.47 (0.06)
0.06 (0.01)	0.02 (0.02)	-0.01 (0.04)	-0.03 (0.02)	0.02 (0.01)
0.14 (0.15)	0.05 (0.05)	-0.01 (0.02)	-0.03 (0.02)	0.03 (0.02)
(· · · · · · · · · · · · · · · · ·		FIG. 5C	0.00 (0.02)	2.30 (3.02)

poly(styrene/acrylonitrile)	poly(methyloctadecylsiloxane)	poly(vinyl butryral)	poly(ethylene glycol)	poly(2,4,6-tribromostyrene)	polystrene
15	16	17	18	19	20
0.00 (0.00) 0.00 (0.00) 0.00 (0.00) 0.01 (0.00) 0.02 (0.00) 0.00 (0.01) 0.00 (0.00) 0.01 (0.00) 0.00 (0.01) 0.00 (0.00) 0.01 (0.00) 0.01 (0.00) 0.00 (0.00) 0.00 (0.00) 0.00 (0.00) 0.00 (0.00) 0.00 (0.00) 0.01 (0.00) 0.00 (0.00) 0.00 (0.00) 0.01 (0.00) 0.00 (0.00) 0.00 (0.00) 0.01 (0.00)	0.42 (0.02) 0.41 (0.03) 0.49 (0.02) 0.46 (0.02) 0.28 (0.02) 0.72 (0.02) 0.40 (0.02) 0.49 (0.03) 0.51 (0.01) 0.45 (0.02) 0.41 (0.02) 0.45 (0.02) 0.45 (0.02) 0.45 (0.02) 0.45 (0.02) 0.53 (0.02) 0.42 (0.02) 0.50 (0.03) 0.23 (0.02) 0.21 (0.02)	1.14 (0.27) 0.45 (0.22) 0.89 (0.14) 1.04 (0.18) 1.51 (0.20) 0.54 (0.21) 1.03 (0.23) 0.62 (0.19) 0.77 (0.21) 0.77 (0.24) 1.01 (0.21) 0.70 (0.20) 1.03 (0.28) 1.15 (0.17) 0.87 (0.20) 0.90 (0.12) 0.96 (0.31) 1.44 (0.25) 1.58 (0.25)	2.37 (0.25) 1.23 (0.14) 1.79 (0.08) 1.95 (0.06) 2.12 (0.11) 1.85 (0.04) 1.95 (0.09) 2.13 (0.49) 1.73 (0.11) 2.08 (0.11) 2.41 (0.19) 2.34 (0.25) 1.85 (0.07) 2.34 (0.29) 1.63 (0.10) 1.85 (0.06) 1.85 (0.10) 2.14 (0.10) 2.78 (0.20)	0.12 (0.06) 0.01 (0.02) 0.04 (0.03) 0.07 (0.06) 0.25 (0.04) 0.01 (0.02) 0.13 (0.02) 0.03 (0.01) 0.03 (0.03) 0.09 (0.05) 0.03 (0.03) 0.07 (0.05) 0.14 (0.04) 0.06 (0.08) 0.07 (0.04) 0.042 (0.04) 0.27 (0.03)	-0.46 (0.73) -0.01 (0.82) 0.23 (0.94) -0.21 (0.80) 0.47 (0.59) -0.29 (0.69) 0.17 (0.32) -0.03 (0.32)

 $0.00\ (0.00)\ 0.17\ (0.11)\ 0.34\ (0.26)\ 1.36\ (0.48)\ 0.01\ (0.04)\ -0.50\ (0.76)$ $0.00\ (0.00)\ 0.46\ (0.01)\ 0.74\ (0.16)\ 2.26\ (0.23)\ 0.08\ (0.03)\ 0.09\ (0.48)$ $0.00\ (0.00)\ 0.01\ (0.02)\ 0.09\ (0.18)\ 0.09\ (0.09)\ 0.00\ (0.13)\ 0.04\ (0.78)$ $0.00\ (0.01)\ 0.04\ (0.04)\ 0.00\ (0.14)\ 0.13\ (0.13)\ 0.01\ (0.03)\ -0.32\ (0.87)$





